

Standard Candles Working Groups

1 - White Dwarfs

2 - Isolated Neutron Stars



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SC1 : White Dwarfs

- Objects
 - HZ 43
 - Sirius B
- Physical Models
 - White dwarf Atmosphere Models
 - Parameters (nH , eff. T , $\log(g)$, absolute Flux, abundance)
 - $\rightarrow nH$ well constrained $\rightarrow <10^{18} \text{ cm}^2$
 - Most up-to-date atmosphere codes used (Tübingen, TLUSTY)
 - pure hydrogen good fit (very little Helium required)
 - better possibly stratified Hydrogen + Helium model \rightarrow needs to be tested
- Instruments
 - ROSAT
 - EUVE
 - Chandra LETGS

SC1 : White Dwarfs

- Status of Models / Parameters for HZ43 and Sirius B
 - Available fits are done and complete see below:
 - Pease et al. SPIE, 2000 → LETG effective area
 - Beuermann, Burwitz, Rauch A&A, 2006 → corr. sugg. to LETGS eff area,
ROSAT and EUVE
 - Kaastra et al. A&A, 2007 in prep. → independent check of Models
- To Do
 - Check differences Beuermann / Kaastra model fluxes for Sirius B
 - Implement corrections for LETGS effective area.
 - EUVE: check why effective area is too low
 - ROSAT improvements to instr. params. need to implemented (Beuermann et al.)